

PPSC Physics Chapter 1 MECHANICS

Sr	Questions	Answers Choice
1	Newton's first law of motion provides the definition of.	A. Distance B. Force C. Vector D. Acceleration
2	The reluctance of a body to start moving is called.	A. Mass B. Weight C. Force D. Inertia
3	If a ball was thrown out of a rocket in free space, then it would.	A. Accelerate away from the rocket B. Remain motionless after leaving the rocket C. Travel rectilinearly with constant speed D. Move always parallel to the rocket
4	When a man jumps off the ground, the reaction force of the ground is.	A. Equal to the weight of the man. B. Smaller than the weight of the man C. Greater than the weight of the man D. Zero
5	Inertial mass and gravitational mass are	A. Opposite B. Proportional C. Weights D. Inversely proportional
6	The mass that appears in Newton's second law is known as.	A. Rest mass B. Gravitational mass C. Inertial mass D. Weight
7	If the force acting on a body is doubled its acceleration becomes.	A. Half B. Constant C. Double D. One fourth
8	If a body is moving with constant velocity then	A. Its acceleration is zero B. Its direction may be changing C. Its speed may be changing D. Its acceleration is constant
9	If slope of velocity time graph gradually decreases, then a body is said to have	A. Negative acceleration B. Positive acceleration C. Uniform velocity D. Variable velocity
10	The cross product of two vectors is magnitude when	A. Vectors are parallel B. Vectors are antiparallel C. Vectors are perpendicular D. They are rotated through 270°
11	The scalar product of two vectors is negative when	A. Vectors are parallel B. Vectors are antiparallel C. Vectors are perpendicular D. Vectors are parallel with same magnitude
12	Which pair of the following forces has a resultant force of 2 N.	A. 1 N and 1 N B. 1 N and 3 N C. 1 N and 2 N D. 2 N and 2 N
13	The reverse process of vector addition is called	A. Negative of a vector B. Subtraction of vectors C. Resolution of vectors D. Multiplication of vector
14	If the resultant of two forces, each of magnitude F have the magnitude F, angle between the forces will be.	A. 30° B. 80° C. 90° D. 120°

15	The magnitude of resultant of three force is 3. If its x-component is 2, Y component is 1. Its 2-component will be.	A. 1 B. 2 C. 3 D. 4
16	Which one of the following is not true.	A. velocity can be negative B. velocity is a vector C. Speed is a scalar D. Speed can be negative
17	The resultant magnitude of two vectors	A. Is always positive B. Can never be zero C. Can be negative positive or zero D. Is usually zero
18	Which vector gives the displacement from one point to another in space.	A. Position vector B. Unit vector C. Null vector D. Distance vector
19	Vectors are often spilt into two or more orthogonal components what is true of these components.	A. they are perpendicular B. They are parallel C. They are antiparallel D. They have same magnitude
20	Which are the two basic properties of a vector.	A. Curvature and direction B. Magnitude and direction C. Magnitude and sign D. Curvature and sign